

To Members of the FCC,

Results from the Technical Working Group, as well as common sense, tell us that LightSquared's ground-based radio signals (1525-1559 MHz) - well over a billion times stronger than the GPS satellite signals - will disrupt the GPS signals in the adjacent spectrum (L1, 1575.42 MHz).

I have worked in county governments building and managing Geographic Information System (GIS) technology, for over 11 years. The basis for locating and mapping the roads, fire trucks, pipelines, land parcels, and environmental habitats that are of concern to citizens and customers of our County – derived from accurate data collected from GPS observation. Disrupting GPS would disrupt the very core of our civic institutions and operations.

If LightSquared were allowed to use their part of the spectrum for ground-based cell phone transmission, there are no technical means to insulate nor mitigate the disruption to all GPS users with current technology - and hundreds of billions of dollars have been invested in this technology.

This is a problem that doesn't have to happen. The FCC can rescind its conditional approval of the radio spectrum for ground-based transmission use. As you know, LightSquared originally purchased the spectrum with the expressed purpose of Mobil Satellite Service (MSS), and only recently applied for a conditional waiver to repurpose the spectrum ("modification of its Ancillary Terrestrial Component"). Such a modification would disable a vital national resource. It must be rescinded.

The potential windfall profit to LightSquared (perhaps up to \$12 Billion) for gaining approval to use this spectrum is insignificant compared to the loss of productivity attributable to high-accuracy GPS reception (over \$96 Billion a year, every year). The FCC could encourage LightSquared to use this spectrum for MSS purposes only, or it could require LightSquared to build its cell phone network using a different spectrum. The current ill-conceived, dangerous, disruptive project must not be implemented.

Sincerely,
Garrett Dunwoody
County GIS Manager
San Mateo County, CA